## Ethnobotany (EBOT)

### EBOT F100  Introduction to Ethnobotany  (a)
3 Credits
Basic concepts of botany and ethnobotany, with emphasis on the native flora of Alaska and how people use these plants. Basic plant biology and taxonomy; scientific methods of plant collection, including identification and curation; use of native Alaska plants for food and medicines; ethnobotanical methods of collecting plant-use information from indigenous cultures and ways that this information contributes to other fields of study, such as resource management, community development, and human health.

**Lecture + Lab + Other:** 2 + 3 + 0

### EBOT F195  Special Topics
1-6 Credits

**Lecture + Lab + Other:** 1-6 + 0 + 0

### EBOT F195P  Special Topics
1-6 Credits

**Lecture + Lab + Other:** 1-6 + 0 + 0

### EBOT F200  Seminar in Ethnobotany  (a)
1 Credit
Offered Spring Odd-numbered Years
Surveys basic concepts of ethnobotany and ethnoecology, with emphasis on how people use plants, the role of plants in traditional food systems, and the dynamics of human-plant -ecosystem interactions in a context of rapid social, ecological and climatic change. Lectures and discussion focus specifically on plant use in Alaska and other high latitude geographic and ecological settings, but ethnobotanical research in mid latitude and tropical settings will be referenced where appropriate. Students will gain a basic understanding of plant biology and taxonomy; plants and ecosystem services; the use of native Alaska plants for food and medicines; the economics of innovative plant-based businesses; and the cultural and economic significance of plant use to other cultures worldwide.

**Prerequisites:** EBOT F100; or permission of instructor.

**Lecture + Lab + Other:** 1 + 0 + 0

### EBOT F210  Ethical Wildcrafting  (a)
1 Credit
Offered Fall
Prerequisites: EBOT F100; or permission of instructor
Provides an understanding of the industry of wildcrafting: the gathering, harvesting, processing and in some cases, marketing of nontimber forest products. Specific examples from Alaska will be used to illustrate all aspects of this course, from identification of native flora, to a conceptualization of the unique market niche that Alaskan natural products fill, to native plant propagation and effects of invasive plants.

**Lecture + Lab + Other:** 1 + 0 + 0

### EBOT F220  Ethnobotanical Techniques  (a)
2 Credits
Offered Spring
Provides required skills for conducting field investigations into the human use of plants. Focuses on interviewing elders about native plant use and methods for conducting structured and non-structured interviews, plant collection, participant observation and data analysis. Ethical issues in ethnobotany, e.g., intellectual property rights, benefit-sharing and conservation of native plants.

**Prerequisites:** EBOT F100; EBOT F200.

**Lecture + Lab + Other:** 1.5 + 0 + 1.5

### EBOT F230  Ethnobotanical Chemistry  (a)
3 Credits
Offered Fall
Basic understanding of chemical structure and function of medicinally active plant compounds. How and why plants produce primary and secondary compounds, how humans use these compounds and methods used to isolate and deliver plant-derived compounds. How drugs are derived from plants and the ethics of bioprospecting. Medicinal flora of Alaska from a chemical perspective.

**Prerequisites:** EBOT F100; CHEM F103X or CHEM F105X.

**Lecture + Lab + Other:** 3 + 0 + 0

### EBOT F393  Special Topics
1-9 Credits

**Lecture + Lab + Other:** 1-9 + 0 + 0